Frontier will apply industry best practices by minimizing water withdrawals and ensuring the protection of water quality in the region.

Minimizing water usage
Frontier will have one of the lowest water use intensities in the industry, and will be designed to ensure that water withdrawals do not impact the Athabasca River:

**Low water use intensity**: Frontier water use intensity is expected to average 1.9 barrels of river water per barrel of bitumen, lower than the industry average of 2.5 barrels per barrel of bitumen.

**90 per cent of processing water will be recycled**: Additional water will be withdrawn from the Athabasca River only to compensate for losses through evaporation and tailings management.

**No water withdrawals during low flow periods**: The project’s design incorporates sufficient off-stream water storage capacity to meet the site’s water requirements for up to 120 days. This means that water withdrawals can be stopped entirely during seasonal low river flow periods.

Protecting water quality
The project will take a comprehensive approach to protecting groundwater and surface water quality in the region:

**Clean water will be diverted** around the mine during operations.

**De-watering of tailings** via a centrifuge plant will significantly reduce the volume of fluid tailings in ponds.

**A monitoring system and network of pumping wells** will surround the perimeter of the tailings area to capture and recycle any material that may seep from the ponds and a hydraulic barrier around the tailings area will be installed to ensure seepage control post-closure.

For more information, go to [www.frontieroilsands.com](http://www.frontieroilsands.com)